Reply to Office Action of 2/13/2006

IN THE CLAIMS

Please cancel claims 1 and 11.

Please amend claims 2-10 and 12 as follows.

Please add new claim 20 as follows.

Listing of Claims:

Claim 1. (Cancelled)

Claim 2. (Currently Amended) A millimeter wave-radar according to

claim 15, wherein [the] a radio wave absorbing layer is provided to a side surface

of the radome or the radar cover.

Claim 3. (Currently Amended) A millimeter wave-radar according to

claim 15, wherein the radome or the radar cover is provided with a radio wave

absorbing layer [has] having its performance adjusted according to its position

with respect to the transmission/reception antenna.

Claim 4. (Currently Amended) A millimeter wave-radar according to

claim 15, wherein the radome or the radar cover is provided with a radio wave

absorbing layer [has] having a higher dielectric loss than that of a material of the

radome or the radar cover.

Claim 5. (Currently Amended) A millimeter wave-radar according to

claim 15, wherein the radome or the radar cover is provided with a radio wave

absorbing layer that is a magnetic loss layer.

Claim 6. (Currently Amended) A millimeter wave-radar according to

claim 15, wherein the radome or the radar cover is provided with a radio wave

absorbing layer [has] having a higher dielectric constant than that of a material

of the radome or the radar cover.

Reply to Office Action of 2/13/2006

Claim 7. (Currently Amended) A millimeter wave-radar according to claim 15, wherein the radome and the radar cover use a material with a dielectric constant of 3.0 or lower in a portion thereof corresponding to a front of the transmission/reception antenna.

Claim 8. (Currently Amended) A millimeter wave-radar according to claim 15, wherein the radome and the radar cover use, as a main ingredient in a portion thereof corresponding to a front of the transmission/reception antenna, at least one of polycarbonate, syndiotactic polystyrene, polypropylene and a combination of these materials as a main ingredient and acrylonitrile butadiene styrene (ABS).

Claim 9. (Currently Amended) A millimeter wave-radar according to claim 15, wherein the radome or the radar cover is provided with a radio wave absorbing layer [is] formed of only a layer having a predetermined angle to a surface of the transmission/reception antenna or of a combination of the layer having the predetermined angle and a layer having a predetermined angle to a normal of the surface of the transmission/reception antenna.

Claim 10. (Currently Amended) A millimeter wave-radar according to claim 15, wherein the <u>radome or the radar cover is provided with a radio wave absorbing layer is a mesh of less than 1/4 of wavelength.</u>

Claim 11. (Cancelled)

Claim 12. (Currently Amended) A millimeter wave-radar [according to claim 1,] comprising:

an antenna base having a transmission/reception antenna;

a housing fixing the antenna base; and

at least a radome or a radar cover enclosing the antenna base;

Reply to Office Action of 2/13/2006

wherein the radome or the radar cover is provided with a radio wave absorbing layer formed through an insert molding process or a double molding process; and

wherein the radome or the radar cover has a greater dielectric constant in a portion thereof corresponding to a side of the transmission/reception antenna than in a portion thereof corresponding to a front of the antenna.

Claim 13. (Previously Presented) A millimeter wave-radar according to claim 12, wherein the radome and the radar cover use in a portion thereof corresponding to a front of the transmission/reception antenna a material with a dielectric constant of 3.0 or lower.

Claim 14. (Previously Presented) A millimeter wave-radar according to claim 12, wherein the radome and the radar cover use, as a main ingredient in a portion thereof corresponding to a front of the transmission/reception antenna, at least one of polycarbonate, syndiotactic polystyrene, polypropylene and a combination of these materials as a main ingredient and ABS.

Claim 15. (Previously Presented) A millimeter wave-radar comprising:

an antenna base having a transmission/reception antenna;

a housing fixing the antenna base; and

at least a radome or a radar cover enclosing the antenna base;

wherein the radome or the radar cover has a dielectric constant which progressively increases from a front of the transmission/reception antenna toward a side of the antenna.

Claim 16. (Previously Presented) A millimeter wave-radar comprising:

an antenna base having a transmission/reception antenna;

a housing fixing the antenna base; and

Reply to Office Action of 2/13/2006

at least a radome or a radar cover enclosing the antenna base;

wherein the radome or the radar cover has a dielectric constant which progressively increases from a front of the transmission/reception antenna toward a side of the antenna, and wherein the radome and the radar cover use in a portion thereof corresponding to a front of the transmission/reception antenna a material with a dielectric constant of 3.0 or lower.

Claim 17. (Previously Presented) A millimeter wave-radar comprising:

an antenna base having a transmission/reception antenna;

a housing fixing the antenna base; and

at least a radome or a radar cover enclosing the antenna base;

wherein the radome or the radar cover has a dielectric constant which progressively increases from a front of the transmission/reception antenna toward a side of the antenna, and wherein the radome and the radar cover use, as a main ingredient in a portion thereof corresponding to a front of the transmission/reception antenna, at least one of polycarbonate, syndiotactic polystyrene, polypropylene and a combination of these materials as a main ingredient and acrylonitrile butadiene styrene (ABS).

Claims 18-19. (Cancelled)

20. (New) A millimeter wave-radar comprising:

an antenna base having a transmission/reception antenna;

a housing fixing the antenna base; and

at least a radome or a radar cover having an electronic permeability which progressively decreases from a front of the transmission/reception antenna toward a side of the antenna.